

IN THE UNITED STATES DISTRICT COURT
FOR THE NORTHERN DISTRICT OF CALIFORNIA

POWER INTEGRATIONS, INC.,
Plaintiff,
v.
FAIRCHILD SEMICONDUCTOR
INTERNATIONAL, INC., et al.,
Defendants.

Case No. [09-cv-05235-MMC](#)

**ORDER DENYING DEFENDANTS'
RENEWED MOTION FOR JUDGMENT
AS A MATTER OF LAW, NEW TRIAL,
AND/OR REMITTITUR; GRANTING IN
PART AND DENYING IN PART
PLAINTIFF'S MOTION FOR
PREJUDGMENT INTEREST**

Dkt. Nos. 954, 955

Before the Court are the following two motions: (1) "Renewed Motion for Judgment as a Matter of Law [("JMOL")], New Trial, and/or Remittitur Pursuant to Federal Rules of Civil Procedure 50 and 59," filed February 12, 2016, by defendants Fairchild Semiconductor International, Inc., Fairchild Semiconductor Corporation, and Fairchild (Taiwan) Corporation (collectively, "Fairchild"); and (2) "Renewed Motion for Prejudgment Interest," filed February 12, 2016, by plaintiff Power Integrations, Inc. ("PI"). The motions, which have been fully briefed, came on regularly for hearing on June 17, 2016. Frank E. Scherkenbach, Howard G. Pollack, and Michael R. Headley of Fish & Richardson P.C. appeared on behalf of PI. Blair M. Jacobs, Christina A. Ondrick, and Patrick Stafford of Paul Hastings LLP appeared on behalf of Fairchild. Having considered the parties' respective written submissions and the arguments of counsel at the hearing, the Court rules as follows.

BACKGROUND

PI and Fairchild are manufacturers of power supply controller chips and compete in the same market. Power supply controller chips are integrated circuits used in power

1 supplies, i.e., chargers, for cellular phones, computers, and other electronic devices. On
 2 November 4, 2009, PI filed the above-titled action against Fairchild and System General
 3 Corporation (“SG”),¹ asserting claims for infringement of U.S. Patent Nos. 6,538,908
 4 (“‘908 Patent”) and 6,212,079 (“‘079 Patent”), and, on May 5, 2010, Fairchild and SG
 5 counterclaimed for infringement of U.S. Patent No. 5,747,977 (“‘977 Patent”).² All of the
 6 patents-in-suit pertain to methods and apparatuses used in power supplies; the ‘908
 7 Patent describes a multi-function pin, and the ‘079 and ‘977 Patents describe methods for
 8 increasing the efficiency of a power supply in standby mode.

9 In February and March 2014, the Court presided over a sixteen-day trial, in which
 10 the jury found Fairchild had infringed PI’s ‘908 and ‘079 Patents, and found PI had not
 11 infringed Fairchild’s ‘977 Patent. The jury awarded PI \$105 million in damages, based on
 12 the opinion of its damages expert Jonathan Putnam, Ph.D. (“Dr. Putnam”) that such
 13 amount constituted a reasonable royalty.

14 Thereafter, on November 25, 2014, Fairchild moved for a new trial on the issue of
 15 damages, in light of VirnetX, Inc. v. Cisco Sys., Inc., 767 F.3d 1308 (Fed. Cir. 2014),
 16 which decision was issued six months after the jury rendered the above verdict. VirnetX
 17 concerned the general rule that a patentee seeking damages based on an infringing
 18 product containing both patented and unpatented features must “apportion damages only
 19 to the patented features.” See id. at 1329. In particular, VirnetX clarified that the
 20 “obligation to apportion damages only to the patented features does not end with the
 21 identification of the smallest salable unit if that unit still contains significant unpatented
 22

23 ¹ In the Complaint, PI alleges SG committed the initial acts of infringement. In
 24 2007, SG was acquired by Fairchild, and, in 2014, the caption of the Complaint was
 25 amended to remove SG as a defendant.

26 ² Initially, PI asserted a claim for infringement of U.S. Patent No. 6,351,398 (“‘398
 27 Patent”), and Fairchild counterclaimed for infringement of U.S. Patent Nos. 7,257,008
 28 (“‘008 Patent”) and 8,179,700 (“‘700 Patent”). Prior to trial, the parties withdrew their
 respective claims as to the ‘398 and ‘008 Patents, and the Court granted summary
 judgment in favor of PI on Fairchild’s claim for infringement of the ‘700 Patent.

features.” Id. As Dr. Putnam had acknowledged that his royalty calculation did not apportion beyond the “smallest salable unit,” and PI had disclaimed reliance on the entire market value rule (“EMVR”), the sole exception to the apportionment requirement,³ the Court granted a new trial on the issue of damages. (See Order, filed Nov. 25, 2014.) The parties’ experts were afforded the opportunity to offer new damages opinions in light of VirnetX.

Subsequently, on a motion brought by Fairchild pursuant to Daubert v. Merrell Dow Pharm., 509 U.S. 579 (1993), the Court excluded the expert opinion of Dr. Putnam to the extent it purported to apportion damages to the patented features of Fairchild’s products, finding Dr. Putnam had not conducted a proper apportionment. (See Order, filed Oct. 8, 2015.) The Court, however, allowed PI to proceed on an alternative royalty theory, in which Dr. Putnam, in reliance on EMVR, did not endeavor to apply principles of apportionment and instead calculated damages based on the entire value of the infringing products.

In December 2015, the Court held a nine-day re-trial on the issue of damages, during the course of which Dr. Putnam presented his damages theory. In particular, Dr. Putnam opined that at a hypothetical negotiation occurring in 2003, the parties would have considered various types of losses PI would have suffered if Fairchild were permitted to infringe without obtaining a license, and further opined that the parties would have arrived at a royalty designed to offset such losses. In that regard, Dr. Putnam testified that the parties would have anticipated the following three categories of losses PI would sustain due to Fairchild’s infringement: (1) a \$75.8 million loss in sales PI otherwise would have made in the absence of Fairchild’s sales (see Trial Tr. at 1203:10-21) (hereinafter, “lost sales”); (2) a \$16.9 million loss, due to a reduction in the price at which PI could sell its units, given Fairchild’s infringing sales at lower prices (see id. at

³ As discussed below, EMVR allows a patentee to “assess damages based on the entire market value of the accused product . . . where the patented feature creates the basis for customer demand.” VirnetX, 767 F.3d at 1326 (emphasis omitted).

1203:25-1204:8) (hereinafter, “price erosion”); and (3) a \$47.1 million loss, representing PI’s lost opportunity to charge a licensing fee on Fairchild sales PI would not have made but which Fairchild made using PI’s patented technology (see id. at 1204:9-23) (hereinafter, “fee for infringing use”). Taking the sum of those three categories, Dr. Putnam determined PI’s anticipated losses would total \$139.8 million. (See id. at 1204:24-1205:2.) The jury awarded PI damages in the amount of \$139.8 million, again accepting Dr. Putnam’s opinion as to a reasonable royalty.

By the instant motion, Fairchild now seeks judgment in its favor, or, in the alternative, a new trial, on the grounds that said award was not supported by the evidence in the record and was based on an improper method of calculation. PI, by its motion, seeks an award of prejudgment interest in the amount of \$39,115,455.

LEGAL STANDARD

A. Motion for Judgment as a Matter of Law

A court properly grants “a renewed motion for judgment as a matter of law . . . if the evidence, construed in the light most favorable to the nonmoving party, permits only one reasonable conclusion, and that conclusion is contrary to the jury’s verdict.” Pavao v. Pagay, 307 F.3d 915, 918 (9th Cir. 2002). “A jury’s verdict must be upheld,” however, “if it is supported by substantial evidence.” Id. Substantial evidence is “evidence adequate to support the jury’s conclusion, even if it is also possible to draw a contrary conclusion.” Id. Although, in deciding a motion for JMOL, the court “review[s] the record as a whole, it must disregard evidence favorable to the moving party that the jury is not required to believe, and may not substitute its view of the evidence for that of the jury.” Johnson v. Paradise Valley Unified Sch. Dist., 251 F.3d 1222, 1227 (9th Cir. 2001) (internal quotations and citations omitted).

B. Motion for New Trial

“The trial court may grant a new trial, even though the verdict is supported by substantial evidence, if the verdict is contrary to the clear weight of the evidence, or is based upon evidence which is false, or to prevent, in the sound discretion of the trial

judge, a miscarriage of justice.” Hanson v. Shell Oil Co., 541 F.2d 1352, 1359 (9th Cir. 1976) (internal quotation and citation omitted). In determining whether to grant a new trial, the court “need not view the evidence from the perspective most favorable to the prevailing party.” Landes Constr. Co. v. Royal Bank of Canada, 833 F.2d 1365, 1371 (9th Cir. 1987). Although “a decent respect for the collective wisdom of the jury . . . suggests that in most cases the judge should accept the findings of the jury regardless of his own doubts in the matter,” a new trial should be granted “[i]f, having given full respect to the jury’s findings, the judge . . . is left with the definite and firm conviction that a mistake has been committed.” Id. at 1371-72 (internal quotation and citation omitted).

DISCUSSION

A. Fairchild’s Motion for Judgment as a Matter of Law

Where a defendant is found liable on a claim of patent infringement, “the court shall award the claimant damages adequate to compensate for the infringement, but in no event less than a reasonable royalty for the use made of the invention by the infringer.” See 35 U.S.C. § 284. “Two alternative categories of infringement compensation are the patentee’s lost profits and the reasonable royalty he would have received through arms-length bargaining.” Lucent Techs., Inc. v. Gateway, Inc., 580 F.3d 1301, 1324 (Fed. Cir. 2009). The most common means of calculating a reasonable royalty is based on a “hypothetical negotiation” between the parties, which method “assumes the asserted patent claims are valid and infringed,” and “attempts to ascertain the royalty upon which the parties would have agreed had they successfully negotiated an agreement just before infringement began.” See id. at 1324, 1325.

1. Sufficiency of the Evidence in Support of the Jury’s Finding that PI is Entitled to a Royalty Based on the Entire Market Value of Fairchild’s Infringing Products

As noted, a patentee ordinarily may “seek only those damages attributable to the infringing features,” and may instead invoke EMVR and “assess damages based on the entire market value for the accused product *only where* the patented feature creates the basis for customer demand” for said product. VirnetX, 767 F.3d at 1326 (internal

quotation and citation omitted) (emphasis in original). As a result, “it is the exception, not the rule, that damages may be based upon the value of the multi-component product,” and “[i]n the absence of . . . a showing” by the patentee that “the patented feature creates the basis for customer demand[,] . . . principles of apportionment apply.” Id. (internal quotation and citation omitted).

a. Sufficiency of the Evidence in Support of the Jury’s Finding that the ‘079 Feature is the Basis for Customer Demand

(1) Sufficiency of PI’s Evidence

Fairchild first argues it is entitled to JMOL because, although PI’s damages theory relied on EMVR, PI failed to offer sufficient evidence to prove that either the ‘908 or the ‘079 patented features created the basis for customer demand for Fairchild’s products. In response, PI, as set forth below, points out the evidence supporting its position that the ‘079 feature⁴ constituted the basis for customer demand for the infringing products.

First, it is undisputed that the ‘079 patented feature “reduce[s] the power consumption” and “improve[s] the efficiency” of power supply controller chips (see Trial Tr. at 1480:19-20), and PI’s witnesses offered testimony that customers in the market for such chips considered that feature to be essential (see id. at 325:24-25 (PI’s Chief Executive Officer (“CEO”) testifying “you could not have sold the product without this feature”; 772:22-24 (PI’s technical expert testifying “the ‘079 patented technology . . . as a technical matter, would have been required”)). According to those witnesses, the ‘079 technology became an essential feature of power supply controller chips when President George W. Bush, in July 2001, issued an Executive Order requiring federal agencies to purchase only electronic products capable of meeting a “one watt” efficiency standard “in their standby power consuming mode” (see id. at 296:22-23), as the ‘079 technology was the only technology available at the time that was capable of meeting such standard as

⁴ PI did not attempt to show that the feature covered by the ‘908 Patent constituted the basis for customer demand for the accused products.

well as other customer requirements (see id. 299:14-18 (PI's CEO testifying '079 feature was only technology that could meet one-watt standby standard and customer "requirements" of low "ripple" and no "audible noise"); 531:7-10 (PI's Vice President ("VP") of Product Development testifying no technology was available, other than '079 technology, that could address new standard); 793:11-15 (PI's technical expert testifying "there is no other way to meet" the "one-watt standby energy consumption requirement")). PI's CEO further testified that President Bush's Executive Order effectively made the '079 feature a necessity for all power supply controller chips, regardless of whether they ultimately would be used to supply federal contracts, as incorporating the '079 technology in every power supply was "the only way" customers could be "sure that they [would] not [be] excluded from the government opportunity." (See id. at 297:2-11 (testifying Executive Order was "turning point for the whole industry" and led customers to "decide[] that they have to meet one watt in all of their products," given that the "government was the largest purchaser of electronic products," and "when a company makes a product," it does not "know what product[s] [are] going to be purchased by the government").)

Next, PI submitted evidence that, in addition to considering the '079 feature essential, its second largest customer, one SG was actively pursuing, "specifically demand[ed] [that] the '079 frequency reduction feature" be included in the power supply controller chips PI was manufacturing for it. (See id. at 315:10-12.)

Additionally, PI's witnesses testified that when, in November 2000, the company introduced its TOPSwitch-GX chip ("GX"), the first of its power supply controller chips to practice the '079 invention, that chip rapidly outsold PI's TOPSwitch-FX chip ("FX"), which practiced an older technology called "burst mode," but was otherwise identical to the GX. (See id. at 323:10-12 (PI's CEO testifying '079 patented feature was only difference between GX and FX); 324:17-20 (PI's CEO testifying "[t]his was the first time we [had] a product [i.e., the FX] that is basically going away very, very quickly [b]ecause of the '079 invention in the TOPSwitch-GX"); 519:14-18 (PI's VP of Product Development

1 testifying there was a “very rapid decline of the FX,” as “the FX was instantly or virtually
 2 instantly of little use because the GX introduced such an important feature in the ‘079”);
 3 701:16-19 (PI’s technical expert testifying “main technical difference” between FX and GX
 4 was “adoption in GX of the ‘079 patent[ed] invention”).)

5 Further, PI introduced SG documents highlighting the ‘079 patented feature,
 6 namely, a product press release (see PX 1820; Trial Tr. at 303:2-24) and a 2004 article
 7 written by an engineer employed by SG, in which the engineer stated: “increasingly
 8 stringent government regulations regarding power consumption have been driving
 9 demand for power converters with reduced standby consumption” (see PX-1833; Trial Tr.
 10 at 317:12-319:25), i.e., with the ‘079 patented feature.

11 Fairchild argues “[s]uch evidence is insufficient as a matter of law to establish
 12 EMVR” under the test set forth in LaserDynamics, Inc. v. Quanta Computer, Inc., 694
 13 F.3d 51 (Fed. Cir. 2012). (See Def.’s Mot. at 18:1-5.)⁵

14 As a threshold matter, the Court finds LaserDynamics factually distinguishable
 15 from the instant case. There, the plaintiff sought to recover damages based on the entire
 16 value of a multipurpose product, namely, a laptop computer, and the plaintiff’s patent only
 17 covered a method for “disc discrimination,” i.e., for identifying the type of device (e.g., a
 18 CD-ROM or DVD) a user has inserted into the laptop’s disc drive, see LaserDynamics,
 19 694 F.3d at 56, a feature that serves only one of a laptop’s many purposes, see id. at 68
 20 (noting laptops’ “plethora” of features), and is relatively minor compared to many of its
 21 other features. Under the circumstances presented therein, LaserDynamics concluded
 22 that the jury’s finding that the patentee’s disc discrimination method formed the basis for
 23

24 ⁵ Although Fairchild also contends PI’s “proof at trial wholly failed to establish the
 25 buying preferences of Fairchild’s customers,” as opposed to those of PI (see Def.’s Mot.
 26 at 18:19-20 (emphasis omitted)), the record contains evidence that the parties were
 27 competitors and had the same customers. (See, e.g., Trial Tr. at 305:3-4 (PI’s CEO
 28 testifying PI had “same” customers as SG); 517:22-518:13 (PI’s VP of Product
 Development testifying PI was selling to “exact same” customers as SG); 756:9-10 (PI’s
 technical expert testifying SG was targeting “generally the same market that [PI’s]
 TOPSwitch-GX was trying to address”).)

customer demand for the entire laptop was unsupported by the evidence. See id. at 68-69 (citing, as “illustrative,” Lucent, 580 F.3d at 1332, wherein “patented feature was ‘but a tiny feature of one part of a much larger software program’”).⁶

Here, by contrast, the accused products are not multipurpose laptop computers or any other type of multipurpose product, but, rather, chips with a single purpose, which the ‘079 feature plays a significant role in achieving. Specifically, the accused chips are used in power supplies to “convert[]” the energy that “comes out of the wall outlet” for delivery to an “electronic product[].” (See Trial Tr. at 267:13-16; see also Def.’s Trial Brief, filed Dec. 10, 2015, at 1:16-17 (stating accused chips “perform the specific function of regulating the power output of the power supply”).) The ‘079 feature, in turn, “improv[es] [the] efficiency” of a power supply controller chip in delivering energy to the charging device. (See Trial Tr. at 692:20; 276:18 (PI’s CEO describing ‘079 patent as “energy efficiency patent”).) Because the accused chips at issue here, unlike the laptops in LaserDynamics, have a single purpose, regulating the amount of energy delivered to a charging device, which purpose is directly served by the patented technology’s function of increasing the efficiency of such delivery, it is not unreasonable for the jury to have found the patented feature here constitutes the basis for consumer demand for the accused products. See Veracode, Inc. v. Appthority, Inc., 137 F. Supp. 3d 17, 82 (D. Mass. 2015) (distinguishing “laptop computers . . . at issue in LaserDynamics” and declining to set aside jury’s finding that EMVR applied; noting “here the product at issue has a very specific consumer purpose,” which the product “achieves . . . in large part through [the patented technology]”).

In support of its argument that PI’s evidence failed to meet LaserDynamics’ evidentiary standards, Fairchild first contends PI’s evidence that the ‘079 feature was

⁶ In Lucent, the Federal Circuit found the evidence therein insufficient to support EMVR, where the plaintiff sought to recover damages based on the full value of Microsoft Outlook, a software program comprising, inter alia, e-mail, a “fully functional calendar system,” and an “electronic Rolodex™,” and the plaintiff’s patent only covered a “date-picker” tool used in the calendar application. See 580 F.3d at 1332, 1337.

essential to customers and was emphasized in SG's promotional documents is insufficient under LaserDynamics, which held "[i]t is not enough to merely show that the [patented feature] is viewed as valuable, important, or even essential to the use of the [infringing product]." See 694 F.3d at 68. Next, as to PI's evidence that the GX chip outsold its predecessor, the FX chip, Fairchild cites LaserDynamics' holding that proof that consumers, "if given a choice between two otherwise equivalent [infringing products], only one of which practices [the patent]," would "choose the [infringing product] having the [patented] functionality says nothing as to whether the presence of that functionality is what motivates consumers to buy [the infringing product] in the first place." See id.

In response, PI cites three Federal Circuit decisions that pre-date LaserDynamics, each of which upheld an EMVR finding and, in so doing, relied on evidence that LaserDynamics, as discussed above, arguably would find inadequate to support EMVR. In the first of those three cases, Bose Corp. v. JBL, Inc., the Federal Circuit, in holding that "substantial evidence" supported a royalty based "upon the entire value of [defendant's] loudspeakers," relied on evidence of an increase in the plaintiff's "sales in the year following the introduction of [the plaintiff's] speakers containing the invention." See 274 F.3d 1354, 1361 (Fed. Cir. 2001).⁷

In Fonar Corp. v. General Elec. Co., the second of the three cases on which PI relies, the Federal Circuit, in holding the record contained substantial evidence in support of EMVR, relied on the defendant's "own technical literature of record," which "emphasized the [patented] feature." See 107 F.3d 1543, 1552-53 (Fed. Cir. 1997).

In the third such case, Tec Air, Inc. v. Denso Mfg. Michigan, Inc., the Federal Circuit, in affirming an award based on EMVR, found the jury "could have reasonably concluded that the demand for [an] entire [radiator and condenser] assembly depended

⁷ Fairchild argues Bose is "inapposite, because that case involved a stipulation between the parties that the patented feature created the basis of customer demand." (See Def.'s Mot. at 21 n.8.) Fairchild, however, cites no reference to any such stipulation in Bose, and the Court, having reviewed the opinion and the district court's order under review therein, has found none.

1 on the patented invention,” a method for balancing the fan contained in the assembly,
 2 where, without the patented method, the defendant could not meet a particular balance
 3 specification, and “after [the defendant] changed its specification,” one of its customers
 4 “complained and required [the defendant] to rebalance the fans.” See 192 F.3d 1353,
 5 1362 (Fed. Cir. 1999).⁸

6 Although one might argue that LaserDynamics, as compared with the three earlier
 7 cases, contains a more thorough analysis of the issue, the Court notes that none of those
 8 decisions is discussed in LaserDynamics, let alone criticized in any respect therein.
 9 Moreover, as PI points out, to the extent LaserDynamics cannot be reconciled with Bose,
 10 Fonar, and Tec Air, this Court is bound by the holdings in the earlier cases, as “prior
 11 decisions of a panel of the [Court of Appeals] are binding precedent . . . unless and until
 12 overturned in banc.” See Newell Companies, Inc. v. Kenney Mfg. Co., 864 F.2d 757, 765
 13 (Fed. Cir. 1988) (holding, where two panel decisions conflict, “first” decision is
 14 “precedential”).

15 In sum, LaserDynamics is factually distinguishable from the instant case, and
 16 further, Fairchild has neither shown that the evidence in the record is inadequate to
 17 support a finding of EMVR under several precedential Federal Circuit cases, nor shown
 18 that this Court may decline to follow the holdings in those cases. Accordingly, Fairchild
 19 has failed to show the verdict should be set aside on the ground that PI’s evidence is
 20 insufficient to support EMVR under LaserDynamics.

21 //

22 //

23
 24 ⁸ PI also relies on Marine Polymer Techs., Inc. v. HemCon, Inc., a more recent en
 25 banc decision in which the Federal Circuit found the jury’s application of EMVR was
 26 supported by “evidence pertaining to the importance of [the patented feature] in [the
 27 defendant’s] products and its significance for market demand.” See 672 F.3d 1350, 1360
 28 (Fed. Cir. 2012) (internal quotation and citation omitted). In that decision, however, the
 Federal Circuit’s affirmance was by an equally divided vote, rendering the opinion non-
 precedential on the question of the type of evidence needed to support an award based
 on EMVR. See Taylor v. Tenant Tracker, Inc., 710 F.3d 824, 827 n.2 (8th Cir. 2013)
 (“[A]n affirmance by an equally divided [en banc] court is not binding precedent.”).

(2) Whether Fairchild's Evidence Compelled a Contrary Finding on EMVR

Next, Fairchild argues that, for two reasons, evidence introduced by Fairchild independently renders EMVR inapplicable as a matter of law. First, Fairchild contends that because it offered "undisputed evidence . . . that other features, beyond the '079 patented feature, contributed to consumer demand for the infringing Fairchild products," the jury "did not have a legally sufficient basis to find" the '079 feature was the only basis of customer demand. (See Def.'s Mot. at 20:1-3 (emphasis omitted).) Fairchild's characterization of its evidence, however, is not wholly accurate. Although the record contains evidence that some of the unpatented features had value (see, e.g., Trial Tr. at 393:6 (PI's CEO testifying "frequency jitter" feature "contributed to the commercial success" of PI's power supply controller chips), Fairchild points to no undisputed testimony or other evidence that such features drove demand for the products. Second, Fairchild contends that EMVR is inapplicable because Fairchild presented evidence that "in some market segments, customers did not . . . need or want the '079 patented feature." (See Def.'s Mot. at 21:6-8.) Fairchild, however, cites no case holding a patentee relying on EMVR must show the patented feature creates the basis for every individual customer's purchase.

Accordingly, Fairchild has not shown the jury's finding that the '079 feature constituted the basis for customer demand for the infringing products should be set aside on the asserted ground that it is unsupported by substantial evidence.

b. Sufficiency of the Evidence in Support of the Jury's Finding that the Accused Products are a Single Functioning Unit

An additional requirement for application of EMVR is that the "patented and unpatented components [of the infringing product]" constitute "a single functioning unit." See Rite-Hite Corp. v. Kelley Co., Inc., 56 F.3d 1538, 1550 (Fed. Cir. 1995). Here, Fairchild argues no reasonable jury could have found the patented and unpatented features of its infringing products operate as a single functioning unit, because, according to Fairchild, the evidence showed the patent "cover[s] only one specific operational

mode” of Fairchild’s products. (See Def.’s Mot. at 22:7-9 (emphasis omitted).) The issue, however, is not the number of operational modes covered by the patent but, rather, whether “the unpatented components . . . function together with the patented component in some manner so as to produce a desired end product or result.” See Rite-Hite, 56 F.3d at 1550, 1551 (finding single-functioning-unit test not satisfied where patented and unpatented components were sold together “only for marketing reasons, not because they essentially functioned together”).

Accordingly, Fairchild has not shown the verdict should be set aside on the asserted ground that the patented and unpatented components of its products do not function as a single unit.

c. Whether the Court Issued Improper Jury Instructions Regarding EMVR

Relying on Ericsson, Inc. v. D-Link Sys., Inc., 773 F.3d 1201 (Fed. Cir. 2014) and LaserDynamics, Fairchild argues the Court erred in failing to instruct the jury that “the rule in determining reasonable royalty damages is to apportion, and that applying EMVR is the exception to that rule,” and “accentuated the error by giving the standard for EMVR before giving the standard on apportionment.” (See Def.’s Mot. at 22:16-20 (emphasis omitted).)

In Ericsson, the Federal Circuit held “district courts must make clear to the jury that any royalty award must be based on the incremental value of the invention.” See 773 F.3d at 1235. In LaserDynamics, the Federal Circuit described EMVR as a “narrow exception” to the apportionment requirement. See 694 F.3d at 67.

Here, the Court instructed the jury that “there are two alternative reasonable royalty damages theories, apportionment and entire market value rule.” (See Jury Instructions at 14:15-16.) The Court further instructed that, in order for the jury to find EMVR applies to an “entire multi-feature product,” the plaintiff must “establish[] that the patented feature creates the basis for customer demand for that product,” and that “[u]nder the apportionment of damages rule, the ultimate damages must reflect the value

1 attributable to the infringing features of the product, and no more.” (Id. at 14:17-22.)
2 Lastly, the Court cautioned the jury: “If it is not established that the patented feature
3 creates the basis for customer demand for the product, you must apportion the royalty
4 down to a reasonable estimate of the value of the patented feature.” (Id. at 14:24-26.)

5 Contrary to Fairchild’s argument, neither of the cases it cites in support thereof
6 requires the Court to further instruct the jury that apportionment is the “rule” to which
7 EMVR is an “exception.” Moreover, to the extent Fairchild argues such instruction should
8 be required, the Court disagrees. Whether a particular finding is based on a generally
9 applicable legal standard, or on one applicable only in limited circumstances, has no
10 bearing on the jury’s determination of whether the facts presented meet such standard.
11 See Gordon v. New York City Bd. of Educ., 232 F.3d 111, 118 (2d Cir. 2000) (holding jury
12 need not be instructed on concepts that are “not the province of the jury”); Henry v.
13 Wyeth Pharm., Inc., 616 F.3d 134, 154 (2d Cir. 2010) (holding, in instructing jury, “trial
14 judges should not import uncritically language . . . developed by appellate courts for use
15 by judges”) (internal quotation, citation, and alteration omitted). For the same reasons,
16 the Court finds unpersuasive Fairchild’s argument that the Court was required to give the
17 instruction on apportionment prior to giving the instruction on EMVR. The jury need only
18 be instructed, as it was here, on the “correct legal standard[s]” for making its findings.
19 See id. Consequently, Fairchild, has not met the “heavy” burden required of a party
20 attempting to “demonstrat[e] that an error has come about from sequential arrangement
21 of [the] sentences” of a jury instruction. See Texas & Pac. Ry. Co. v. Jones, 298 F.2d
22 188, 191 (5th Cir. 1962).

23 Accordingly, as the Court was not required to tell the jury that apportionment is the
24 rule and EMVR is the exception, nor was it required to address those concepts in any
25 particular order, Fairchild has not shown the verdict should be set aside on grounds of
26 instructional error. The Court next turns to Fairchild’s arguments regarding Dr. Putnam’s
27 methodology.
28

1 **2. Whether Dr. Putnam’s Methodology Caused the Jury to Award an**
 2 **Improper “Double Recovery”**

3 Fairchild contends the damages award should be set aside because Dr. Putnam’s
 4 methodology led the jury to award an impermissible “[d]ouble [r]ecovery.” (See Def.’s
 5 Mot. at 9:3.)

6 Fairchild first argues “Dr. Putnam’s damages theory . . . overcompensates by
 7 providing damages for both full actual lost profits damages,” i.e., lost sales and price
 8 erosion on sales PI would have or did make, “and an additional reasonable royalty,” i.e.,
 9 a fee for infringing use on sales PI would not have made. (See id. at 8:5-7 (emphasis
 10 omitted)). Those three categories of loss are, however, distinct types of harm suffered by
 11 a patentee, and, as a result, a patentee may, on a sufficient showing, recover for each
 12 type of loss without running afoul of the prohibition on double recovery. See Crystal
 13 Semiconductor Corp. v. TriTech Microelectronics Int’l, Inc., 246 F.3d 1336, 1354, 1357
 14 (Fed. Cir. 2001) (holding “patentee may obtain lost profit damages for that portion of the
 15 infringer’s sales for which the patentee can demonstrate ‘but for’ causation and
 16 reasonable royalties for any remaining infringing [sales]”; further holding patentee may
 17 also recover for “[r]eduction of [its] prices, and consequent loss of profits, enforced by
 18 infringing competition”) (internal quotation and citation omitted).

19 Fairchild next argues there nonetheless has been a double recovery in the instant
 20 case because Dr. Putnam, in calculating both lost profits and a fee for infringing use,
 21 “use[d] all 435,254,064 infringing Fairchild units.” (See Def.’s Mot. at 9:16-18 (emphasis
 22 omitted).) Fairchild appears to argue that PI obtained a double recovery for the reason
 23 that price erosion is caused by price competition, and price competition is caused by the
 24 infringer’s sales of the infringing products, which sales include sales for which Dr. Putnam
 25 calculated a fee for infringing use. As a result, according to Fairchild, the verdict awarded
 26 PI damages “that necessarily arose from the same infringing acts.” (See id. at 9:13-14
 27 (emphasis omitted); see also id. at 9 n. 4 (“It is not the counting of units that is
 28 impermissible, but the use of the same acts of infringement to calculate two separate

forms of damages (lost profits and a royalty).”) (emphasis omitted).⁹

Fairchild is correct that a patentee’s price erosion damages are caused by infringing sales, see Crystal Semiconductor, 246 F.3d at 1357 (noting plaintiff’s “[r]eduction of prices” is caused by “infringing competition”) (internal quotation and citation omitted), as are a patentee’s damages due to the infringer’s failure to pay a fee for its infringing use. Fairchild cites no authority, however, holding a single wrongful act cannot result in more than one compensable harm. Indeed relevant authority exists to the contrary. See Power Integrations, Inc. v. Fairchild Semiconductor Int’l, Inc., 711 F.3d 1348, 1378 (Fed. Cir. 2013) (holding “damages for infringement may account for both lost sales and reduction of prices due to infringing competition,” as “an infringer’s activities do more than divert sales to the infringer[;] [t]hey also depress the price of the patented product”) (internal quotation, citation, and alteration omitted).¹⁰

Accordingly, Fairchild has not shown the verdict should be set aside on the asserted ground that the jury award constituted a double recovery.

3. Whether Dr. Putnam’s Methodology Improperly Caused the Jury to Award the Entirety of PI’s Lost Profits in Damages

Fairchild next argues that Dr. Putnam’s royalty calculations “wrongly focused on

⁹ Although Fairchild also asserts Dr. Putnam made “contradicting . . . assumption[s]” in his royalty analysis (see Def.’s Mot. at 10:12), Fairchild has not attempted to show Dr. Putnam’s use of such assumptions resulted in a double recovery.

¹⁰ Fairchild’s citation to Transclean Corp. v. Bridgewood Servs., Inc., 290 F.3d 1364 (Fed. Cir. 2002), and Rodime PLC v. Seagate Tech., Inc., 174 F.3d 1294 (Fed. Cir. 1999), for the proposition that PI has been awarded a double recovery is unavailing. First, Transclean is readily distinguishable on its facts. There, the Federal Circuit found a double recovery where the patentee was awarded a royalty based both on sales made by the infringer and on goodwill from the sale of the infringer’s business, for the reason that the “award [on the infringing sales] already compensates [the patentee] for any goodwill [the infringer] garnered by infringement.” See 290 F.3d at 1377 (internal quotation and citation omitted). Next, contrary to Fairchild’s contention, Rodime did not consider the question of a double recovery. Instead, the Federal Circuit held that a patentee pursuing a royalty theory of damages could not recover for consequential business damages, a particular “species of lost profits,” where the patentee had not accounted for those lost profits in the framework of its hypothetical negotiation. See 174 F.3d at 1308.

1 harm actually suffered by PI,” i.e., its “actual lost profits” (see Def.’s Mot. at 11:14-15),
 2 whereas, according to Fairchild, “a patentee’s lost sales are not relevant in a reasonable
 3 royalty analysis” (see id. 6:26-28). Although Fairchild is correct that Dr. Putnam’s
 4 calculations use the parties’ actual sales figures from years subsequent to the
 5 hypothetical negotiation, his calculations represent the parties’ predictions of market
 6 events that, Dr. Putnam testified, were reasonably foreseeable at the time of the
 7 hypothetical negotiation. As PI points out, such approach is authorized under Georgia-
 8 Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116 (S.D.N.Y. 1970), which holds
 9 that, in determining a royalty award, the factfinder may consider, inter alia, “the
 10 anticipated amount of profits that the prospective licensor reasonably thinks he would
 11 lose as a result of licensing the patent.” See id. at 1121 (internal quotation and citation
 12 omitted); see also Powell v. Home Depot U.S.A., Inc., 663 F.3d 1221, 1238 (Fed. Cir.
 13 2011) (holding “patentee’s profit expectation may be considered in the overall reasonable
 14 royalty analysis”) (citing Georgia-Pacific, 318 F. Supp. at 1120).

15 Although Fairchild, in its reply, concedes that Georgia-Pacific allows for
 16 consideration of a patentee’s anticipated lost profits, Fairchild argues that a patentee
 17 nevertheless is not permitted to recover “one hundred percent of lost profits” as a
 18 reasonable royalty.¹¹ (See Def.’s Reply at 7:8-10). Fairchild, however, cites no case in
 19 which a patentee was barred from recovering the entirety of its actual lost profits as a
 20 royalty. Although in Rite-Hite Corp. v. Kelley Co., Inc., 56 F.3d 1538 (Fed. Cir. 1995), the
 21 Federal Circuit found the royalty awarded, representing half the patentee’s expected lost
 22 profits, was “reasonable” under the facts presented therein, it did not, contrary to
 23 Fairchild’s characterization, hold that a royalty award must be “discounted from actual

24
 25 ¹¹ Fairchild makes a related argument that the Court erred in instructing the jury
 26 that a “damages award should put the patent holder in approximately the financial
 27 position it would have been in had the infringement not occurred” (see Jury Instructions at
 28 13:6-7) because, according to Fairchild, such instruction wrongly “focused the jury on
 making PI financially whole” (see Def.’s Mot. at 17:4). Read in context, however, the
 challenged language does no more than tell the jury that a prevailing patentee is entitled
 to the royalty it would have obtained had a licensing negotiation been conducted.

lost profits” (see Def.’s Mot. at 7:19-20), or that lost profits may only serve “as a check on a reasonable royalty number” (see id. at 8:16-17).¹² Indeed, the Federal Circuit has held that a reasonable royalty may exceed a patentee’s anticipated profits. See Powell, 663 F.3d at 1238 (holding “patentee’s profit expectation” is not “a cap on the reasonable royalty that the patentee may receive”) (emphasis omitted).

Accordingly, Fairchild has not shown the verdict should be set aside on the ground that the royalty calculated by Dr. Putnam included the full amount of PI’s anticipated lost profits.

4. Whether Dr. Putnam Improperly Used the Parties’ Actual Sales Figures to Calculate a Reasonable Royalty

Fairchild further contends Dr. Putnam’s use of the parties’ actual sales figures in his hypothetical negotiation construction was improper, because, according to Fairchild, “the parties in a hypothetical negotiation only know the facts as of [the time of the hypothetical negotiation],” i.e., the time just prior to the period of infringement. (See Def.’s Mot. at 15:17-18.) Fairchild is correct that a “royalty determination for purposes of making a damages evaluation must relate to the time infringement occurred, and not be an after-the-fact assessment.” See Riles v. Shell Expl. and Prod. Co., 298 F.3d 1302, 1313 (Fed. Cir. 2002). Nevertheless, “the hypothetical negotiation analysis permits” and, as the Federal Circuit has recognized, “often requires a [finder of fact] to look to events and facts that occurred thereafter and that could not have been known to or predicted by the hypothesized negotiators.” See Lucent, 580 F.3d at 1333 (Fed. Cir. 2009) (internal quotation and citation omitted). Consequently, evidence of “actual profits generally is admissible as probative of . . . anticipated profits.” See Aqua Shield v. Inter Pool Cover Team, 774 F.3d 766, 772 (Fed. Cir. 2014).

¹² Fairchild’s reliance on AstraZeneca AB v. Apotex Corp., 782 F.3d 1324 (Fed. Cir. 2015) likewise is unavailing. Although the Federal Circuit rejected an argument that the “essential purpose” of calculating a royalty is “to compensate [the patentee] for harm actually suffered,” id. at 1333, it did not hold such loss could not be considered, along with other relevant factors, in arriving at a reasonable royalty.

Accordingly, Fairchild has not shown the verdict should be set aside on the asserted ground that Dr. Putnam's royalty calculations included an improper after-the-fact assessment.

5. Whether the Royalty Award Would Have Bankrupted SG or Would Not Have Allowed SG to Make a Reasonable Profit

Fairchild next argues the Court should set aside the \$139.8 million royalty award, for the reason that a royalty of such magnitude would have bankrupted SG, which had only \$9.8 million in cash reserves at the time of the hypothetical negotiation, or, at a minimum, would have left SG with no opportunity to make a profit. There is, however, no support in the record for either proposition.

First, Fairchild has not shown SG would have gone bankrupt if required to obtain a \$139.8 million license, as SG could have raised its prices to cover the cost of a license. See Douglas Dynamics, LLC v. Buyers Prods. Co., 717 F.3d 1336, 1346 (Fed. Cir. 2013) ("The infringer's selling price can be raised if necessary to accommodate a higher royalty, and indeed, requiring the infringer to do so may be the only way to adequately compensate the patentee for the use of its technology."). In particular, Dr. Putnam testified SG could have increased its price by 32 cents per unit. (See Trial Tr. at 1213:11; 1235:8-12.) Consequently, the funds to pay for the license could have come from sales of the infringing products, and not out of SG's cash reserves. Although, as Fairchild points out, SG "could not have anticipated selling anywhere near the actual 435 million units if it had contemplated [such] price increase" (see Def.'s Mot. at 14:11-13), Dr. Putnam did not use all 435 million units in his calculations; rather, he accounted for decreased demand at his assumed higher price by adjusting downward the number of units Fairchild would have been able to sell and only incorporating in his royalty the profits from that adjusted number of units. (See Trial Tr. at 1203:10-12 (adjusting downward number of units representing PI's lost sales); 1204:15-17 (adjusting downward number of units representing Fairchild's remaining infringing sales).)

Second, contrary to Fairchild's contention that PI "presented no evidence that SG

could expect any profit if it raised its prices to cover the royalty” (see Def.’s Mot. at 14:6-8 (emphasis omitted)), Dr. Putnam testified that SG could have made a profit even if it had to pay the awarded royalty (see Trial Tr. at 1235:8-12 (“Q. What is your opinion of what would have happened in the hypothetical if SG had agreed to pay [a per-unit royalty of] 32 cents per chip? A. They would have charged a higher price and sold fewer units, and been able to compensate Power Integrations as well as make a profit.”).) Fairchild has cited no evidence to the contrary or otherwise attempted to show such opinion is unsound.

Accordingly, Fairchild has not shown the verdict should be set aside on the asserted ground that SG, if required to pay the royalty awarded, would have been rendered bankrupt or unable to make a profit.

6. Sufficiency of the Evidence Offered to Show Fairchild’s Infringing Products are Imported into the United States

Relying on Power Integrations, 711 F.3d at 1376, which decision was issued in the context of prior litigation between the parties, Fairchild argues that the jury verdict should be set aside because, according to Fairchild, PI failed to prove any infringing product “was imported into the United States.” (See Def.’s Mot. at 23:20-22.)¹³ The Court disagrees. Gaurang Shah, a Fairchild executive, while acknowledging the calculation is “not an exact science,” testified that “20 to 30 percent” of Fairchild’s power supply controller chips are imported into the United States. (See Trial Tr. at 1289:5-7.) In Power Integrations, by contrast, the evidence on which plaintiff relied, specifically, a third party’s “mobile phone sales data,” was held “impermissibly speculative” where plaintiff failed to

¹³ The Court does not consider herein Fairchild’s additional argument that a lack of evidence regarding importation of any particular infringing chip forecloses a finding of “specific intent on the part of Fairchild to induce infringement.” (See Def.’s Mot. at 24:12-13.) Such argument is, in effect, a motion for JMOL on the issue of liability and the instant re-trial was limited to the issue of damages. See Aguinaga v. United Food and Commercial Workers Int’l Union, 993 F.2d 1463, 1473 (10th Cir. 1993) (holding “defendant does not have a right to relitigate, at the damages phase, an issue he or she has already litigated and lost at the liability phase”).

present evidence “linking” such data to defendants’ infringing power circuits. See 711 F.3d at 1376 (noting lack of “evidence that the imports of [third party’s] products included chargers” or “evidence that any included chargers incorporated [defendants’] infringing circuits”). Fairchild has made no attempt here to show the evidence on which Dr. Putnam based his calculation is unreliable for similar or other reasons.

Accordingly, Fairchild has not shown the verdict should be set aside on the asserted ground that PI failed to prove Fairchild’s infringing products were imported into the United States.

7. Conclusion as to Fairchild’s Motion for JMOL

As Fairchild has not shown a deficiency as to PI’s evidence or Dr. Putnam’s methodology, Fairchild’s motion for JMOL is hereby DENIED.

B. Fairchild’s Motion for New Trial

Although Fairchild’s motion purports to seek, in the alternative, an order granting a third trial on the issue of damages, Fairchild makes no attempt, apart from essentially incorporating by reference the arguments addressed above, to show the verdict is “contrary to the clear weight of the evidence,” based on “evidence which is false,” or a “miscarriage of justice.” See Hanson, 541 F.2d at 1359 (setting forth grounds on which new trial may be granted). Instead, Fairchild, in the penultimate section of its motion, “requests a new trial . . . for all of the reasons set forth above.” (See Def.’s Mot. at 25:13-14.)¹⁴ The Court, having reviewed the above-discussed evidence under the above-referenced standard for granting a new trial, declines to exercise its discretion to grant such relief.

¹⁴ The only point Fairchild makes that is arguably specific to its entitlement to a new trial is its assertion that a new trial is “warranted because of the excessiveness of the jury’s award,” which, according to Fairchild, constituted “632% of Fairchild’s profits and 262% of its revenue.” (See Def.’s Mot. at 25:20-24); Hanson, 541 F.2d at 1359 (holding new trial may be granted when “amount of compensation awarded is excessive”) (internal quotation and citation omitted). Fairchild, however, cites no evidence in the record to support those figures, and even if the record contains such evidence, a new trial would not be warranted, given PI’s evidence as to Fairchild’s ability to raise prices. See Douglas Dynamics, 717 F.3d at 1346.

1 Accordingly, Fairchild's motion for new trial is hereby DENIED.

2 **C. PI's Motion for Prejudgment Interest**

3 Where a defendant is found liable on a claim of patent infringement, "the court
4 shall award the claimant . . . interest and costs as fixed by the court." See 35 U.S.C.
5 § 284. A prevailing patentee "should ordinarily be awarded" prejudgment interest, as
6 such an award "is necessary to ensure that the patent owner is placed in as good a
7 position as he would have been in had the infringer entered into a reasonable royalty
8 agreement." General Motors Corp. v. Devex Corp., 461 U.S. 648, 655-56 (1983). "[T]he
9 district court has substantial discretion to determine the interest rate in patent
10 infringement cases." Gyromat Corp. v. Champion Spark Plug Co., 735 F.2d 549, 556
11 (Fed. Cir. 1984).¹⁵ "Generally, prejudgment interest should be awarded from the date of
12 infringement to the date of judgment." Nickson Indus., Inc. v. Rol Mfg. Co., 847 F.2d 795,
13 800 (Fed. Cir. 1988). "[I]t may be appropriate," however, "to limit prejudgment interest, or
14 perhaps even deny it altogether, where the patent owner has been responsible for undue
15 delay in prosecuting the lawsuit," General Motors, 461 U.S. at 657, and the accused
16 infringer has been prejudiced thereby, Crystal Semiconductor, 246 F.3d at 1361-62.

17 Here, PI seeks an award of prejudgment interest for the period beginning June 28,
18 2004, and ending December 18, 2015, calculated using the prime rate. Fairchild, citing
19 General Motors, argues PI should be awarded no prejudgment interest, and in the
20 alternative, only for the period beginning November 4, 2009, and ending March 4, 2014,
21 calculated using the Treasury Bill rate.

22 In accordance with the Court's tentative ruling on the record at the hearing, the
23 Court, for the reasons stated by Fairchild in its opposition, finds it appropriate to apply the
24


25 ¹⁵ Although "the determination whether to award simple or compound interest
26 similarly is a matter largely within the discretion of the district court," see id. at 557, here,
27 the parties agree any interest should be compounded (see Putnam Decl. ¶ 3(c) (PI's
28 expert stating "annual compounding of interest is appropriate"); Malackowski Decl. ¶ 11
(Fairchild's expert stating he performed his calculations "assuming annual
compounding"))).

1 Treasury Bill rate and, for the reasons stated by PI in its motion, finds PI is entitled to
2 interest for the period beginning June 28, 2004, and ending December 15, 2015.

3 Accordingly, PI's motion for prejudgment interest is hereby GRANTED in part and
4 DENIED in part, and the parties are hereby DIRECTED to file, no later than September 9,
5 2016, supplemental declarations in which PI's prejudgment interest is calculated for the
6 period from June 28, 2004, through December 18, 2015, using the Treasury Bill rate.

7 **IT IS SO ORDERED.**

8 Dated: August 24, 2016


MAXINE M. CHESNEY
United States District Judge

United States District Court
Northern District of California